

Listing of Claims:

This listing of claims will replace all prior versions, and listings, of claims in the application:

Claim 1 (currently amended): A method for assembling a medical device comprising:
providing a first article of a polymeric material;
providing a second article of a polymeric material;
contacting the first article with the second article along an interface area, the interface area comprising a bond area and a non-bond area; and
fitting a heat shield over the interface area;
exposing the interface area to first article and the second article to a specific portion of the infrared energy;
permitting, with the heat shield, transmission of the infrared energy to the bond area spectrum where the polymeric material of the first article and the polymeric material of the second article absorb infrared energy in order to generate sufficient heat to create a bond between the first article and the second article at the bond area.

Claim 2 (canceled).

Claim 3 (original): The method of claim 2, wherein the shield comprises polytetrafluoroethylene.

Claim 4 (original): The method of claim 1, wherein the first article is a medical housing and the second article is a medical tubing.

Claim 5 (original): The method of claim 1, wherein the first article is a medical tubing and the second article is a medical tubing.

Claim 6 (original): The method of claim 1, wherein the first article is a film and the second article is a flanged port.

Claim 7 (original): The method of claim 1, wherein the first article is a sealed container and the second article is a flanged port.

Claim 8 (original): The method of claim 7, wherein the sealed container is filled with a solution.

Claim 9 (original): The method of claim 8, wherein the solution is a medical solution.

Claims 10-20 (canceled).

Claim 21 (currently amended): A method for assembling a medical device comprising the steps of:

providing a first article of a polymeric material;

providing a second article of a polymeric material;

applying an infrared absorbing pigment to one of the first article or the second article to define an interface area;

contacting the first article with the second article along the interface area, the interface area comprising a bond area and a non-bond area; and

fitting a heat shield over the interface area, the heat shield permitting transmission of infrared energy to the bond area;

bonding the first article to the second article along the interface bond area using infrared exposure.

Claim 22 (original): The method of claim 21, wherein the infrared absorbing pigment comprises carbon black.

Claim 23 (original): The method of claim 21, wherein the infrared absorbing pigment comprises activated charcoal.

Claim 24 (original): The method of claim 21, wherein the infrared absorbing pigment is blended into the polymeric material of the first article or the second article.

Claim 25 (original): The method of claim 21, wherein the infrared absorbing pigment is printed on the first article or the second article.

Claim 26 (original): The method of claim 21, wherein the infrared absorbing pigment is placed on a first portion of a surface of the first or second article in a first concentration and in a second portion of the surface in a second concentration lower than the first concentration.

Claim 27 (original): The method of claim 26, further comprising the step of applying a first infrared exposure to the first portion of the surface to create a seal.

Claim 28 (original): The method of claim 27, further comprising the step of applying a second infrared exposure higher than the first infrared exposure to the second portion of the surface to create a second seal.

Claim 29 (original): The method of claim 21, wherein the first article is a medical housing and the second article is a medical tubing.

Claim 30 (original): The method of claim 21, wherein the first article is a medical tubing and the second article is a medical tubing.

Claim 31 (original): The method of claim 21, wherein the first article is a film and the second article is a flanged port.

Claim 32 (original): The method of claim 21, wherein the first article is a sealed container and the second article is a flanged port.

Claim 33 (original): The method of claim 32, wherein the sealed container is filled with a solution.

Claim 34 (original): The method of claim 33, wherein the solution is a medical solution.

Claim 35 (canceled).

Claim 36 (original): The method of claim 35, wherein the shield is made of glass.

Claim 37 (original): The method of claim 35, wherein the shield is made of polytetrafluoroethylene.

Claim 38 (original): The method of claim 37, wherein the shield includes multiple slots arranged along an axis for allowing the infrared light to reach the interface area and provide multiple sealing areas.

Claim 39 (original): The method of claim 21, wherein the bonding step is performed using infrared lamps.

Claim 40 (original): The method of claim 21, wherein the bonding step is performed using a laser.

Claim 41 (currently amended): A method for assembling a medical device comprising the steps of:

providing a first article of a polymeric material;

providing a second article of a polymeric material;

applying an infrared absorbing pigment to the first article and the second article to define an interface area, the interface area comprising a bond area and a non-bond area;

contacting the first article with the second article along the interface area; and

fitting a heat shield over the interface area, the heat shield permitting infrared energy exposure at the bond area; and

bonding the first article to the second article along the interface bond area using infrared exposure.

Claim 42 (original): The method of claim 41, wherein the first article is a medical tubing and the second article is a medical tubing.

Claim 43 (original): The method of claim 41, wherein the infrared absorbing pigment is blended with the polymeric material from which the first article and the second article are derived.

Claim 44 (original): The method of claim 41, wherein the infrared absorbing pigment is printed on the first and second article.

Claim 45 (original): The method of claim 41, wherein the infrared absorbing pigment is placed on a first portion of a surface of the first or second article in a first concentration and in a second portion of the surface in a second concentration lower than the first concentration.

Claim 46 (original): The method of claim 45, further comprising the step of applying a first infrared exposure to the first portion of the surface to create a seal.

Claim 47 (original): The method of claim 46, further comprising the step of applying a second infrared exposure higher than the first infrared exposure to the second portion of the surface to create a second seal.

Claim 48 (canceled):

Claim 49 (original): The method of claim 48, wherein the shield is made of polytetrafluoroethylene.

Claim 50 (original): The method of claim 49, wherein the shield includes multiple slots arranged along an axis for allowing the infrared light to reach the interface area and provide multiple sealing areas.

Claim 51 (currently amended): A method for assembling a medical device comprising:

- providing a first article of a polymeric material;
- providing a second article of a polymeric material;
- providing an infrared responsive pigmented film;
- placing the infrared responsive pigmented film between the first article and the second article to define an interface area, the interface area comprising a bond area and a non-bond area and contacting the first article with the second article; and
- fitting a heat shield over the interface area, the heat shield permitting infrared exposure at the bond area; and
- applying infrared exposure to bond the first article and the second article at the bond area.

Claim 52 (original): The method of claim 51, wherein the first article is a flanged port and the second article is a film.

Claim 53 (original): The method of claim 51, wherein the first article is a sealed container and the second article is a flanged port.

Claim 54 (original): The method of claim 53, wherein the sealed container is filled with a solution.

Claim 55 (original): The method of claim 54, wherein the solution is a medical solution.

Claim 56 (canceled).

Claim 57 (original): The method of claim 56, wherein the shield is made of polytetrafluoroethylene.

Claim 58 (original): The method of claim 57, wherein the shield includes multiple slots arranged along an axis for allowing the infrared light to reach the interface area and provide multiple sealing areas.

Claims 59-76 (canceled).

Claim 77 (new): The method of claim 1 further comprising constraining with the heat shield the bond area to maintain a desired functional geometry of the bond area.

Claim 78 (new): The method of claim 1 further comprising preventing, with the heat shield, exposure of the non-bond area to infrared energy.

Claim 79 (new): The method of claim 1 further comprising preventing, with the heat shield, distortion of the first and second articles at the interface area.

Claim 80 (new): The method of claim 1 further comprising surrounding the interface area with the heat shield.